	Application No.	Applicant(s)
Notice of Allowability	09/715,693	MIR, NADER F.
	Examiner	Art Unit	
	Roberta A. Shand	2665	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to *amendment filed September 15, 2005*.

2. ☒ The allowed claim(s) is/are *1, 4-14, 16-20 and 22, renumbered 1-18*.

3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a) ☐ All   b) ☐ Some*   c) ☐ None of the:

        1. ☐ Certified copies of the priority documents have been received.

        2. ☐ Certified copies of the priority documents have been received in Application No. _____ .

        3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

    * Certified copies not received: _____ .

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application. **THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.**

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.

5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.

    (a) ☒ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached

        1) ☒ hereto or 2) ☐ to Paper No./Mail Date _____ .

    (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of

        Paper No./Mail Date _____ .

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☐ Notice of References Cited (PTO-892)

2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)

3. ☐ Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No./Mail Date _____

4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material

5. ☐ Notice of Informal Patent Application (PTO-152)

6. ☒ Interview Summary (PTO-413), Paper No./Mail Date *09/30/2005* .

7. ☒ Examiner's Amendment/Comment

8. ☒ Examiner's Statement of Reasons for Allowance

9. ☐ Other _____ .

EXAMINER'S AMENDMENT

1.   An examiner's amendment to the record appears below. Should the changes and/or

additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR

1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the

payment of the issue fee.

2.   Authorization for this examiner's amendment was given in a telephone interview with

Jean Macheledt on Friday, September 30, 2005.

The application has been amended as follows:

Claim 1,

Line 3, "external", has been replace with, --first, second and third external--.

Line 4, "external", has been replace with, --first, second and third external--.

Line 27, "said external first input node and each of said nodes corresponding with

an incoming-link of said bi-directional couplings", has been replaced with, --said

node corresponding with said first external input--.

Line 30, "said external first output node and each of said nodes corresponding with

an outgoing-link of said bi-directional couplings", has been replaced with, --said

node corresponding with said first external output--.

3.   The following is an examiner's statement of reasons for allowance: the prior art does not

teach or fairly suggest for routing a plurality of data segments containing address information,

comprising: a first second and third switch element each comprising a respective external input

for routing data segments into the network and a respective external output for routing data

segment out of the network; a first bi-directional coupling between the first and second switch

elements, a second bi-directional coupling between the first and third switch elements, and a

third bi-directional coupling between the second and third switch elements; and a first controller

for interrogating the address information of each of the segments inbound into the first switch

element, any of the inbound data segments received by the first switch element to be directed out

along a selected exit path way; whereby the exit pathway for any inbound data segments

received is selected according to the address information of the inbound data segment, and if a

contention exists for the exit pathway, further according to a priority designator of the data: the

exit pathway to be selected from the group consisting of: if the first switch element is an

outbound destination for the data, the first external output and one of the bi-directional couplings

in communication with the first switch element; **the external input is in direct communication**

with a first input port processor, and the external output with the first output port

processor, each bi-directional coupling comprises an optical fiber link and nay of the data

segments that arrive at the first input port processor, do so as optical signals; the first

switch element comprises a photonic wavelength converter having at least one node to

correspond with an external first input and an external first output and at least two nodes

to correspond with each of the bi-directional couplings; said node corresponding with said

first external input is in direct communication with a respective optical wavelength

demultiplexor; and said node corresponding with said first external output is in direct

communication with a respective optical wavelength multiplexor, as recited in independent

claim 1, 4, 7, 14-18, 20 and 22.

4.   Any comments considered necessary by applicant must be submitted no later than the

payment of the issue fee and, to avoid processing delays, should preferably accompany the issue

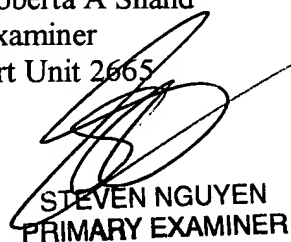fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for

Allowance."

Conclusion

5.   Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Roberta A Shand whose telephone number is 571-272-3161. The

examiner can normally be reached on M-F 9:00am-5:30pm.

6.   If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Huy Vu can be reached on 571-272-3155. The fax phone number for the

organization where this application or proceeding is assigned is 571-273-8300.

7.   Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published applications

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

applications is available through Private PAIR only. For more information about the PAIR

system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR

system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Roberta A Shand
Examiner
Art Unit 2665

STEVEN NGUYEN
PRIMARY EXAMINER